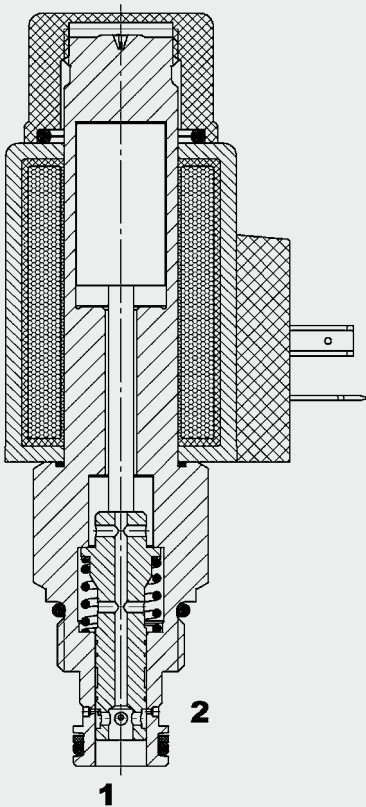


up to 10 l/min  
up to 350 bar

## FUNCTION



The PWK06020V is a normally closed, direct-acting, spring-loaded, spool type proportional flow control valve.

It is non-compensated and its function is to control the flow from port 1 to port 2 smoothly. The energization of the coil reduces or increases an orifice cross-section and thus controls the flow. Together with a pressure compensator the proportional flow control valve can be used as a 2-way flow regulator – for example when required to lift/lower variable loads at the same velocity.

## Proportional Flow Control Valve Spool Type, Direct-Acting, Normally Open Metric Cartridge – 350 bar PWK06020V

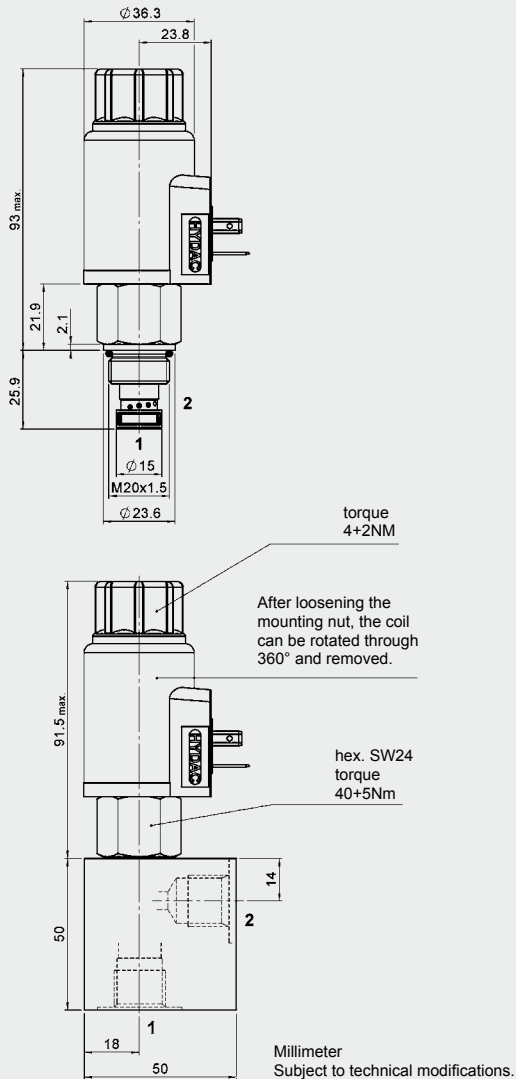
### FEATURES

- Stepless adjustment of the effective oil flow, depending on the coil current.
- Excellent stability throughout the entire flow range
- Excellent dynamic performance
- External surfaces zinc-plated and corrosion-proof
- Hardened and ground internal valve components to ensure minimal wear and extended service life
- Coil seals protect the solenoid system
- Wide variety of connectors available
- Low pressure drop due to CFD optimized flow path

### SPECIFICATIONS

Operating pressure:	max. 350 bar
Nominal flow:	max. 10 l/min
Internal leakage:	max. 0.9 l/min (at 350 bar / 32 mm <sup>2</sup> /s)
Media operating temperature range:	min. -20 °C to max. +100 °C
Ambient temperature range:	min. -20 °C to max. +60 °C
Operating fluid:	Hydraulic oil to DIN 51524 Part 1 and 2
Viscosity range:	min. 7.4 mm <sup>2</sup> /s to max. 420 mm <sup>2</sup> /s
Filtration:	Class 19/17/14 according to ISO 4406 or cleaner
Installation:	No orientation restrictions
Materials:	Valve body: high tensile steel Spool: hardened and ground steel Seals: NBR (standard) FKM (optional) Back-up rings: PTFE
Cavity:	Metric 06020
Weight:	0.46 kg
<b>Electronic data:</b>	
Control currents:	1750 mA; 4.1 Ohm (12V) / 850 mA; 17.6 Ohm (24V)
Dither frequency:	80 - 100 Hz
Hysteresis with dither:	4 - 6 % of I nom
Repeatability:	< 1 % of I nom
Hysteresis:	< 1 % of I nom
Response sensitivity:	< 1 % of I nom
Coil type:	Coil ... P...-4...-50-1836

## DIMENSIONS



## MODEL CODE

**PWK 06020V - 01 M - C - N - 6 - 24 PG**

**Basic model** \_\_\_\_\_  
Proportional flow control valve

**Function symbol** \_\_\_\_\_  
V = normally open

**Type** \_\_\_\_\_  
01 = standard

**Manual override** \_\_\_\_\_  
No details = without manual override  
M = manual override

**Body and ports** \_\_\_\_\_  
C = cartridge only

**Seals** \_\_\_\_\_  
N = NBR (standard)  
V = FKM (optional)

**Flow rate** \_\_\_\_\_  
6 = 6 l/min  
Other flow rates on request

**Coil voltage** \_\_\_\_\_  
DC: 12 = 12 Volt DC  
24 = 24 Volt DC  
Other voltages on request

**Coil connector types 50-1836** \_\_\_\_\_  
DC: PG = DIN connector to EN175301-803  
PT = AMP Junior Timer, 2 pole, radial  
PL = Lead-wires, 457mm long  
PN = Deutsch connector, 2 pole  
Other connectors on request

### Standard models

Model code	Part No.
PWK06020V-01-C-N-6-0 -12 PG	3526096
PWK06020V-01-C-N-6-0 -24 PG	3526100

### Standard in-line bodies

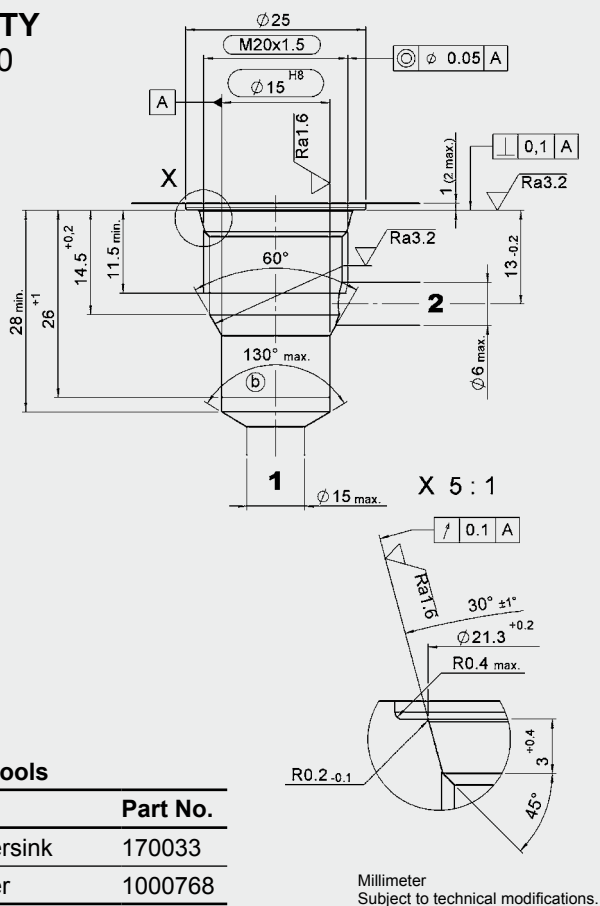
Code	Part No.	Material	Ports	Pressure
R06020-01X-01	275266	Steel, zinc-plated	G1/4	420 bar

Other line bodies on request

### Seal kits

Code	Part No.
SEAL KIT 06020-NBR	3119017
SEAL KIT 06020-FKM	3262477

## CAVITY 06020



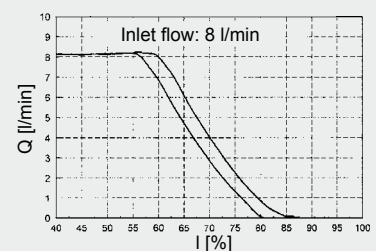
### Form tools

Tool	Part No.
Countersink	170033
Reamer	1000768

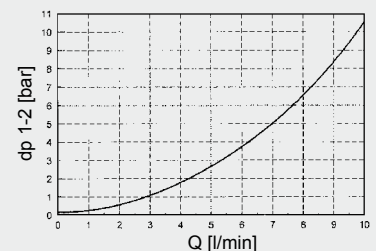
## PERFORMANCE

$T_{oil} = 46\text{ °C}$   
 $v = 33\text{ mm}^2/\text{s}$

PWM = 80 Hz



$T_{oil} = 46\text{ °C}$   
 $v = 33\text{ mm}^2/\text{s}$



### NOTE

The information in this brochure relates to the operating conditions and applications described. For applications and operating conditions not described, please contact the relevant technical department. Subject to technical modifications.

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